TABLE 14.—Cases Closed for Aid to the Blind During the Period November 1. 1936, Through June 30, 1937, Classified by Reason, for Closing Case.

	Num- ber	Per Cent
Total	564	100.0
Death largest cause for closing case	292	51.8
Vision wholly or partially restored	6	1.1
Admitted to public institution	58	10.3
Became self-supporting for reasons other than restoration of sight	30	5.3
Relatives became able to support	46	8.1
Moved out of district	37	6.6
Not eligible for original grant	74	13.1
Other reason	21	3.7

## HOW CASES ARE "CLOSED"

Table 14 gives the reason for closing cases. It is instantly obvious that the only way that over half the cases can be removed from the blind rolls is by the death of the recipient. Two other classifications, one not originally being eligible for the grant in 13 per cent, the other having vision restored in one per cent, afford other possible means of closing cases. The Social Security Board feels that about 10 per cent could be closed if surgery were mandatory where it is clearly indicated. This is already the law in the states of Oregon and Washington.

Oregon, with thirty-six counties, has 405 needy blind receiving an average of \$25.03 a month.

Oregon has thirty-six counties. Capital, Salem. Four hundred and five blind persons were receiving assistance as of June 30, 1937.

Average amount of aid, \$25.03.

Maximum amount of aid allowable per month. \$30.

This state has an Advisory Board of three ophthalmologists.

### HISTORY OF CALIFORNIA LAWS FOR BLIND

The law granting state and county aid to the needy blind in California was enacted by the Legislature in 1929. Prior to the enactment of this legislation the needy blind were granted \$15 a month by the counties. Amendments to the law were enacted in the regular legislative sessions of 1931, 1935, 1937, and the extraordinary session of 1936. The aid is administered in California by the counties under the direction and supervision of the State Department of Social Welfare. Provision for this supervision was included with legislation enacted in 1929. Since July 1, 1936, the Federal Government has been participating in aid to the blind in California under the Social Security Act by a grant of one-half of whatever amount of aid is allowed, up to \$30 a month. Amendments passed in the legislative session of 1937 have liberalized the provision for the state's needy blind.

At present the amount of aid the individual can receive is \$50 a month, with the privilege of increasing this to \$83.33 per month from other

sources, *i. e.*, income from real and personal property owned by applicant, gifts, or applicant's own labor. A wife living separate from her spouse may receive separate aid to the same amount, or a maximum aid possible for the two of \$166.66 per month.

In conclusion, the members of the Advisory Committees hope that these comments on the needy blind and the blind aid law will make all ophthalmologists, all doctors of medicine, and all citizens of the State of California, more familiar with this worthy cause in which we are all so vitally interested. It is our wish that you register your opinions before your local medical societies, and that out of your discussions may come helpful suggestions in this problem.

2007 Wilshire Boulevard.

# A PLEA FOR CONSERVATIVE OBSTETRICS \*

By Abraham Bernstein, M.D. San Francisco

DISCUSSION by Robert D. Dunn, M. D., Palo Alto.

TATISTICS show that of every two hundred women who become pregnant, at least one dies. Seven per cent of the deaths of women between the ages of twenty and forty years are due to puerperal infection. Conservatively estimated, twentythree thousand women die every year in the United States from the immediate and remote effects of childbirth. Tuberculosis is first, childbirth is second, in the number of deaths in women from fifteen to forty years of age. One hundred thousand babies die every year in the United States during delivery, and another one hundred thousand die in the first four weeks thereafter. This is three times as many men's lives as were lost in the World War, and these mothers' and babies' deaths were from causes largely due to the process of childbirth itself, and largely preventable.

What are the causes of these evils? The standard of obstetric practice is low. People are allowed to believe that labor is a natural process and requires no special care. Therefore, men with the best minds and with the greatest skill find their endeavors better rewarded in other specialties of medicine.

The Scandinavian countries show a 4 per cent operative obstetrics against our 10 to 30 per cent. Sweden, Norway, Denmark, and Holland have the lowest rate. Scotland's mortality is as high as that of the United States.

### MATERNAL MORTALITY RATE

Per 10	
	Live Birth
Sweden	27
Scotland	59
United States	67
Italy	26
Japan	

There is no question that better conservation of mother's strength during labor and better trained obstetricians would result in fewer indications for forceps, and consequently we would have less sep-

<sup>\*</sup>From the Department of Obstetrics and Gynecology, Franklin Hospital, and the University of California Medical School.

sis, hemorrhage and shock, and, naturally, better results.

For the past decade the infant mortality rate in San Francisco has steadily declined. Doctor Geiger showed that, in 1934, the rate dropped to an all-low of thirty-three per one thousand live births; in 1935, rose to thirty-five; and in 1936 to forty-two per one thousand. In San Francisco, as in other cities, the majority of infant deaths occur in the neonatal period.

#### CAUSES OF MATERNAL DEATHS

The causes of maternal deaths are criminal abortion, drugs used to bring on abortion, and high forceps, or even low forceps. Cesarean section also takes its toll, especially when done after the patient is infected or has been in labor a long time. In potentially infected cases, where a patient has been examined vaginally and forceps attempted with poor results, the Latzko or extraperitoneal cesarean section should be performed; this would decrease our mortality rate for cesarean section to some extent.

## FORCEPS DELIVERIES

As far as forceps delivery is concerned, the advantages occurring largely benefit the mother, since there is little acceptable evidence that instrumentation is advantageous to the child. I make this statement despite the fact that three-fourths of all forceps deliveries are undertaken because of socalled fetal distress, as indicated by variations in the rate and rhythm of the fetal heart tones. On the assumption that compression of the head and congestion of the cerebral vessels produce the fetal cardiac variations, the birth of a live child after further compression by forceps would seem to constitute prima facie evidence that the hurried delivery was not necessary; as a matter of fact, failure to utilize this excuse for the application of instruments does not disturb the fetal mortality rate. Moreover, there is no good reason to believe that forceps delivery in the course of a slow labor diminishes the risk to the child, in spite of numerous recent warnings that the infant's head may be injured by pounding against the pelvic floor.

Rapid birth, whether preceding naturally or developed artificially by the injudicious use of pituitrin, is far more dangerous to the child, because of the increased likelihood of intracranial hemorrhage. However, there are rare conditions which arise, such as prolapsed cord with the head well down in the canal, in which rapid forceps extraction may be life-saving.

Excluding the large number of "convenience forceps" deliveries done under the name of prophylaxis to save the child or mother from varied and sundry difficulties, the generally recognized indications are eclampsia, placenta previa, heart decompensation, and abruptio placenta. There really is no place in obstetrics for the so-called "convenience forceps." Figures on both the immediate and late injuries to the child show beyond a doubt that the higher the station of the fetal head at the time of delivery the more damage is done. Novey, of the University of Maryland, reports 5 per cent forceps deliveries in a series of 16,442 cases cover-

ing a ten-year period and delivered on the clinic service. The number of forceps deliveries was one in twenty-nine. The total mortality was 1.76 per cent and the corrected infant mortality was 9.4 per cent. From the figures which Novey presents, one can with assurance draw the conclusion that forceps is a dangerous instrument and should only be used upon suitable indications, and only by one skilled in its application.

Plass, in his report in 40,143 births in Iowa, shows a forceps incidence of 7.1 per cent. In the hospital deliveries, the forceps incidence was 13.8 per cent, while in the home the incidence was 4.5 per cent.

The lower operative incidence in home practice was associated with a stillbirth rate 2.45 per cent lower than that obtained in the hospital, 3.61 per cent.

At the Franklin Hospital, in a series of 2,608 deliveries, there was a forceps incidence of 14.6 per cent and a fetal mortality rate of 2.2 per cent.

In the late Doctor Breitstein's practice, in 8,850 deliveries there was a forceps incidence of 12.8 per cent and a fetal mortality of 3.8 per cent.

In my own practice, up to the present time, I have a forceps incidence of 14 per cent and a fetal mortality of 2.5 per cent.

Difficulties in forceps delivery usually appear because the physician has not demanded fulfillment of the classic conditions for the safe application of instruments, namely, that the cervix must be fully dilated or easily dilatable; there must be no disproportion between the head and the pelvis; position of the head must be accurately known so that the blades may be applied in the biparietal diameter and rotation effected in the proper direction, and the bag of water must be ruptured.

The application of forceps through a partially dilated cervix is dangerous, because further dilatation under such circumstances is often accomplished at the expense of lacerations, which may extend up into the lower uterine segment and cause severe bleeding.

Manual dilatation or radial incisions, according to the technique of Duhrssen, offers a more satisfactory solution when immediate delivery is necessary for a cervix that is not fully dilated.

The danger to fetus and mother in forceps delivery depends largely on the indication under which the procedure is undertaken. It also depends on the skill of the operator, but especially on the station of the head. Obviously, there is less danger on a low or perineal forceps than on a mid- or high-forceps delivery.

Cervical lacerations occur with forceps deliveries many times, and immediate repair of such cervical tears has considerable support in many clinics.

## CONCLUSION

In conclusion, I wish to emphasize that women are no different today than they were a thousand years ago. They should be given every chance in the world to have their babies naturally. More conservative obstetrics, and less hurry, will certainly give us better results and help decrease our high maternal mortality rate.

350 Post Street.

#### DISCUSSION

ROBERT D. DUNN, M. D. (300 Hamilton Avenue, Palo Alto).—There is no doubt that the high fetal and maternal morbidity and mortality in this country are due in part to untimely interference by the obstetrician. This morbidity and mortality usually occur when interference is attempted with the head at too high a station and the cervix not fully dilated. If patience could be the watchword when the fetal heart shows no embarrassment to the child and the maternal pulse indicates no deleterious effect on the mother, labor would often advance surprisingly normally. This patience, of course, is difficult to practice even in moderately long labors, when one has the family of the patient constantly demanding that the doctor "do something."

In modern obstetrics this situation is most easily handled by the use of analgesia. The patients under influence of medication do not suffer, and thus permit more prolonged labor. This added time will decrease the incidence of midforceps considerably, but will increase the use of outlet forceps. The latter, however, in trained hands, cannot be considered a factor in increasing either maternal or fetal mortality.

High forceps should have no place in modern obstetrics. Although the mortality of cesarean section is high, that of high forceps is greater. If a patient is infected, with the head still not engaged, either a Latzko extraperitoneal cesarean section or a uterine marsupialization is safer than a high forceps procedure.

Conservatism does not imply a strictly laissez faire policy. It is most essential that the actual condition of the case at hand be understood. Then, if necessary, skillful and timely intervention is just as much a part of conservative treatment as the nonoperative approach to normally advanc-

If the author's plea for conservative obstetrics is to be effective, it is important for us to teach our medical students that interference in an obstetrical case is as serious as undertaking a major surgical operation. Thus, it should be attempted only after careful consideration, and if there is any question as to the advisability of such a procedure, consultation is often a help and always a protection.

## THE LURE OF MEDICAL HISTORY<sup>†</sup>

## TRUTH OVERTAKES "DOCTOR HUNTER"

By A. W. MEYER, M.D. Stanford University

#### PART I

"THATEVER the truth may be, it is best that we should know it; and for truth of any kind we should keep our heads and hearts as cool as we can." Thus wisely counseled James Anthony Froude, in his admirable essay on the science of history. Since the two great Scotsmen, John and William Hunter, have been dead so long, it should not be difficult for anyone to keep his head and heart cool, with respect to the controversy between them. And, as for the truth in the matter, it has been available though apparently unrevealed ever since 1762. It is found in the apparently forgotten though crucial words of William himself. Although we had tried to learn the facts regarding the bitter controversy, this damaging footnote was not mentioned in the biographies, essays, addresses, Hunterian lectures and orations consulted. And, although Paget severely characterized the Medical Commentaries which contain it, and discussed the well-known estrangement, this footnote apparently had no special significance for him.

## AUTHOR'S FORMER REFERENCES

In a footnote to Essays on the History of Embryology, I incidentally expressed sympathy with John in his quarrel with William. I felt prompted to do so after carefully reading John's contribution, of 1780, to the Royal Society of London, entitled "On the Structure of the Placenta," and pondering the letters written by these gifted men regarding it. A few years later, when considering the work of John in embryology, I further stated:

It is difficult to contemplate the splendid royal folio on the gravid uterus <sup>2</sup> by William without sympathy for John. It does not seem possible that the latter could have said what he did, and taken the steps he did more than a generation afterward, if he himself had not made the discovery he claimed, regarding the uteroplacental circulation; and surely nothing could be more evasive than the rejoinder of William. John was very specific and said that William received his conclusion with raillery at the time.<sup>3</sup>

When discussing the contributions to embryology of the Hunters, I reverted to the subject, adding:

It may have been fortunate that John was probably unaware of the views of "eminent anatomists" referred to by Haller on this matter, unless he could also have known what Aranzi and others had thought, and what Falconnet and others [especially Monro, Sr.] had done, in order to solve the vexed problem of the uteroplacental circulation. Concerning the controversy between the two, Teacher regarded the account of William more probable than that of John. [However], one cannot contemplate the rejoinder of William to John, made to the Royal Society on February 3, 1780, without noting its evasion and ambiguity. It must be wholly unconvincing except to those to whom the possession of stolen goods is conclusive proof of their rightpossession of stolen goods is conclusive proof of their rightful ownership, for that is a form of reasoning resorted to by William. Moreover, one cannot help wondering what experience William had that caused him to declare to his students that "... most philosophers, most great men, most anatomists, and most other men of eminence lie like the devil."... it is well to recall William's words regarding the fetal and maternal portions of the decidua as quoted by Teacher (p. lvi), which are to the effect that the quoted by Teacher (p. lvi), which are to the effect that the vessels of these two parts are separate because "those of the umbilical always 'remained uninjected.' 'It was this appearance,' he says (in his lectures of 1775), 'in the cat and bitch that first led me into the apprehension that the human placenta was the same. I thought this for a long time, but I never cared to assert it openly till within these few years."4

#### COMMENT

Since John claimed that he discovered the independence of the uteroplacental circulations in 1754, the last sentence in the above quotation alone would seem sufficient to dispose of William's claim. But, had he really thought so "a long time," that is, before 1754?

This [1755] was within a year of the time when he [John] had the exceptional opportunity to study and dissect a human uterus with fetus near term, injected by McKenzie, and the occasion on which John apparently rediscovered the independence of the maternal and fetal circulations. It seems that the cadaver had been injected through the uterine, and the unborn child through the umbilical vessels, and John said that he conceived the idea of the independence of the circulations while dissecting the placenta. Although he later wrote that his elder brother received the idea with "raillery," when

<sup>†</sup> A Twenty-Five Years Ago column, made up of excerpts from the official journal of the California Medical Association of twenty-five years ago, is printed in each issue of CALIFORNIA AND WESTERN MEDICINE. The column is one of the regular features of the Miscellany department, and its page number will be found on the front cover.

<sup>1</sup> California and West. Med., Vol. 36, No. 6, p. 394 (June), 1932.

<sup>&</sup>lt;sup>2</sup> Hunter, William: Anatomia uteri gravidæ. Birmingham, 1774. <sup>3</sup> California and West. Med., Vol. 43, No. 5, p. 362, col. 1, par. 2 (Nov.), 1935.

<sup>4</sup> California and West. Med., Vol. 46, No. 1, p. 38, par. 2 (Jan.), 1937.